

Macaulay (Petr.) *Read*

AN
ANNIVERSARY DISCOURSE

DELIVERED BEFORE THE

Medical and Chirurgical Faculty

OF

MARYLAND,

ON

MEDICAL IMPROVEMENT.





AN

Anniversary Discourse

DELIVERED BEFORE THE

MEDICAL AND CHIRURGICAL FACULTY

OF

MARYLAND,

TUESDAY, JUNE 3, 1823,

ON

MEDICAL IMPROVEMENT.

BY PATRICK MACAULAY, M. D.

Homines ad Deos nullâ re proprius accedunt, quam salutem hominibus dando.

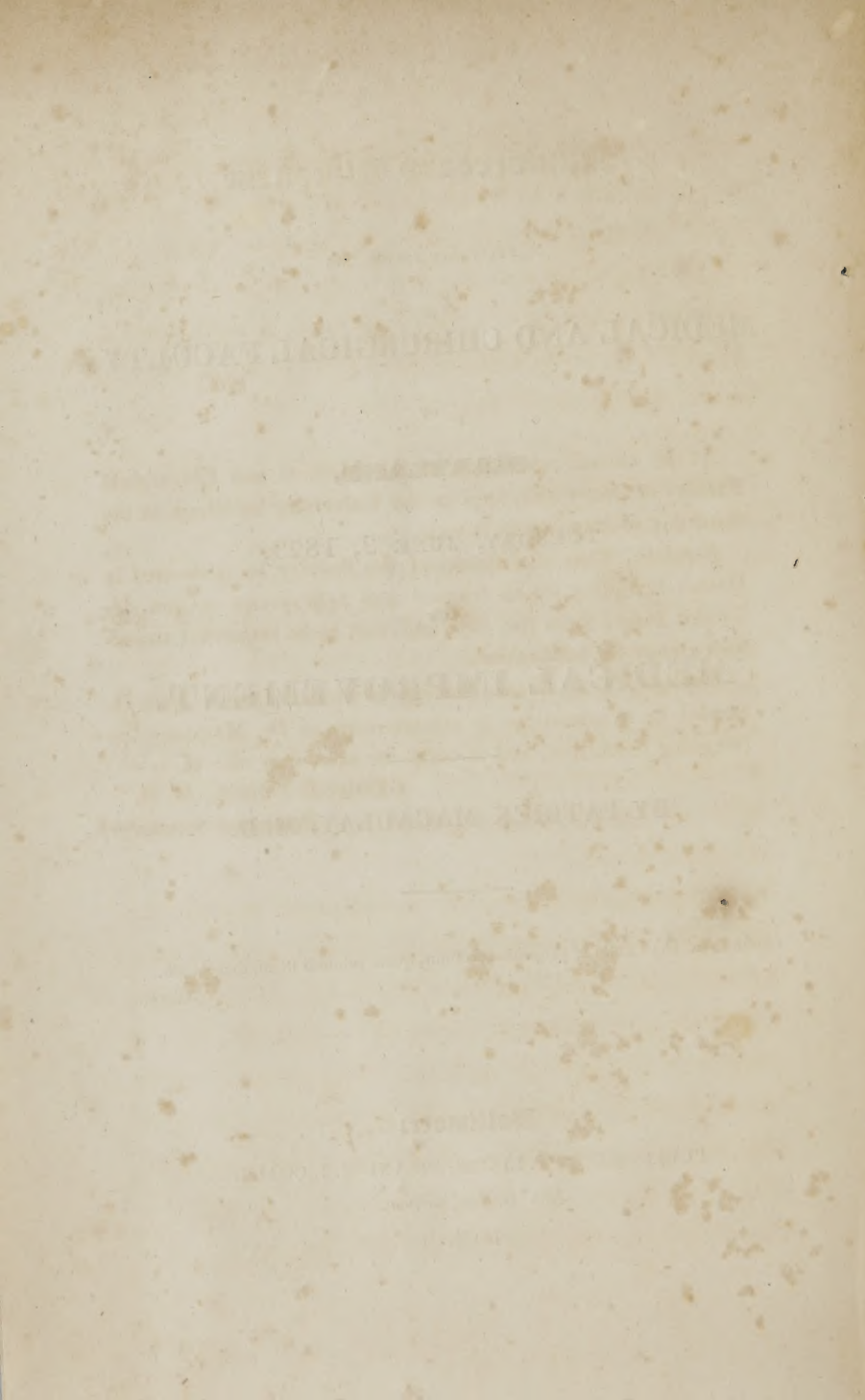
Cicero.

LIBRARY
29677
Baltimore:

PUBLISHED BY F. LUCAS, JR. AND E. J. COALE.

John D. Toy, printer.

1824.



At the annual convention of the Medical and Chirurgical Faculty of Maryland, held in the University buildings on the third day of June, 1823, it was

Resolved, That the thanks of the Faculty be presented to Doctor Macaulay for his learned and appropriate oration delivered before them this day, and that he be requested to furnish a copy for publication.

Resolved, That Doctor George Frick and Doctor John D. Readell be a committee to communicate to Dr. Macaulay the foregoing resolution, and to carry the same into effect.

GEORGE FRICK, M. D.

Recording Secretary.

DISCOURSE.

MR. PRESIDENT,

AND

GENTLEMEN OF THE MEDICAL AND CHIRURGICAL SOCIETY.

I CONGRATULATE you under the happy auspices which I have this day the pleasure of seeing you assembled. I congratulate you on our annual convention, that period which brings with it the recollection of our past associations, and once more unites us for the promotion and protection of our science.

In obedience to your commands it becomes my duty on this occasion to address you. I confess I enter upon the task with the mixed emotions of distrust and confidence—distrust, in my ability to do any subject that ample justice which it claims at my hands by this expression of your regard; and confidence, that the effort, however feeble, will be received with that lenity, the characteristic of every generous mind.

When the Legislature of Maryland in 1799 decreed the establishment, in this state, of a corporation of Physicians and Surgeons, with that spirit which became free and enlightened legislators, they looked at once to the cause of humanity, and the protection of the best interests of the people. They granted to us powers and privileges, which in the language of the charter, would be attended with the most beneficial and salutary consequences to our science, and to our fellow citizens. Following the lights of past ages, the dictates of experience, and with a well directed aim at the benefits which must flow to posterity, they have wisely invested you with such powers as liberal minded monarchs, in ruder times, decreed for the protection and safety of medical science, and from which, in every civilized country, in an era, unequalled in the advancement of human knowledge, and all the refinements which dignify and ennoble life, has produced the greatest advantages, by the union of those exertions which, if unassisted, would have proved fruitless or unknown.

It is a matter of congratulation to every true friend of science and his country, to behold in the wide extended regions of our Republic, the honourable point of view in which our profession

is regarded, and when we contrast it with the low and degraded situation in which we find the practice, particularly of some of the branches, even at the present day, among the most civilized nations of Europe, we are induced, in the first place, to inquire into the causes which have contributed to this effect in a country, whose political existence is but that of yesterday to many centuries; and, in the second place, what are the means which will give stability and perpetuity to our medical character, and increase to its eminence.

If we look back to the first settlement of the colonies, and trace from that period their progress in civilization, up to the time of our glorious revolution, we shall discover but little to interest us in a medical point of view. Flying from oppression, or seeking their fortunes in the destinies of the new world, the colonists, although they came to live beneath the protection and laws of the government under which they were born, left behind them many of the errors in science, inseparable from the changes which their institutions at home had undergone. If our forefathers brought with them religious prejudices, for which many of them deserted the ashes of their ancestry, it was not a matter of any importance, that they should transplant to the wilderness of this

continent the misshapen errors which still clung to the Temple of Medicine in their native land.

Among the difficulties which attended the earlier settlement of North America, no obstacle was found more formidable, or presented a more serious obstacle to the success of the colonists, than the violent and fatal diseases to which they were exposed—diseases resulting from great hardships in a variable climate—a deprivation of those comforts which they had previously enjoyed, and living in an atmosphere highly charged with noxious exhalations. This subject demanded at an early period the attention of the parent government, and able physicians, of its selection, or chosen by the settlers themselves, found their way to our shores. It is a circumstance much to be regretted, that few or no traces of their medical observations and inquiries have been left behind them. As the infant colonies, however, increased, and progressed to that state in which the revolution found them, their necessities, their increasing prosperity, and the great beauty and variety of the natural kingdoms, hitherto but little explored, led from Europe many men, whose talents we should ever delight to honour. Need I mention to you the names of Chisholm, Tennent, and Stowbridge, in medicine; or those of

Kalm, Tillands, Katesby, and many others, the amiable pupils of the celebrated Linnæus, who came to class and describe the rich and varied productions of the new world. Time, whose unceasing flow covers momentarily with its oblivion the actions and labours of men, contributes but to perpetuate the fame of these illustrious individuals, by rendering daily more apparent the utility of their observations upon our diseases, and confirming the value of the many new remedies which they introduced for their cure; and by the constant reproduction of the beautiful tribes of plants which bear their names.

Connected with the early progress which society made in this country after its first settlement, medical attainments continued to be cherished, and became inseparable from a state of existence in a climate so peculiarly hazardous to human life. The encouragement and protection given to medical talents, led many of the army physicians and surgeons to settle among the colonists, and attracted many well educated young men from Edinburgh and London. Acting in their turn upon the native youth, they infused into them that spirit of enterprize and research which carried to Upsal and Leyden, and afterwards to Edinburgh, when in the zenith of their

glory, some of the first geniuses of the past century. European critics may taunt, and servile slaves bend in adulation before a throne with the degrading and fallacious idea, that this is the land "where genius sickens, and where fancy dies," but truth and experience will forever rebuke the revilers, and the votaries of medical science can turn with enthusiastic admiration to the names of Morgan, Shippen, Baynham, and Rush.

It was a subject of no little surprise, that so much genius and talent should have been so early displayed by the young Americans, who crossed the Atlantic with the intention of prosecuting their studies at the European universities. Nor is it foreign to my subject, that I should here advert to that great event which freed the colonies from a foreign yoke.

The arts of medicine and war, however incompatible they may appear, are more nearly allied than we should suppose on a first view. What a spectacle did this people present when they burst the chains which bound them to the car of an European king. Glorious spectacle! a numerous nation, spread over a vast extent of country, touched as by the enchanter's wand, in a moment sprung forth, "a Pallas armed and undefiled." With what pleasure must we ever turn

to the distinguished part which the cultivators of medical science, took in that eventful war. It was the enviable lot of a Shippen, to pour the balm of comfort into the wounds of a half naked, a half starved soldiery; of a Rush, the follower of the immortal Sydenham, to arrest among them the progress of the destructive small pox, by cooling regimen and fresh air; and of a Tilton, to stop in its fell career the fatal typhus, by the invention and construction of his dirt floor hospitals. Let those who contend that medicine is an uncertain or deceitful art, and unworthy of the rank of philosophy, turn to these names written in golden letters on the imperishable page of a nation's history, and behold how much their professional labours contributed to the consummation of our political independence.

Of all the causes which tended to elevate and give dignity to the profession of medicine in this country, by calling into its ranks men of the first genius, previous to the revolutionary contest, none has acted so powerfully as that which resulted from the fact, that the young colonists, with a few exceptions, were generally excluded from distinction and honours under the parent government. With all the enthusiasm of true genius, they were necessarily led to seek eminence

at home by the cultivation of the learned professions, particularly law and medicine. Happy indeed did it prove for their country that neither titled rank, nor the honours and rewards which await upon renown in arms, ever reached them. Destined to be the friends of the soil which gave them birth, and of mankind, many of them lived to receive the high reward of a nation's benedictions and gratitude. It has justly been remarked that revolutions in every age and every country, have called into action dormant talent, and men of the greatest abilities, renowned alike for their virtues and their vices, have sprung forth amid the shocks and convulsions of empires.

If we are to believe one of the most eloquent and disinterested, perhaps the most learned man of his time, who, in writing the British history from the reign of the James' to the present king, has unhesitatingly proclaimed that no country ever produced so splendid a galaxy of talent as stood forth on this continent at the call of liberty.* If we take the eloquence of the senate, the appeals made to the world, or the respectful petitions which carried the injuries of the colonies to the foot of the throne, they are alike unsurpassed. Let it not be forgotten, that among these bold

* Sir James McIntosh.

and eloquent asserters of a nation's rights, many physicians stood preeminent.

This is a fact which forms an era in the annals of medicine. For in the records of no nation do we find that physicians ever were called in trying times into the councils of the nation, or ever before reached such elevated political rank. If we examine into the state of medicine among the Romans, it does not appear ever to have been cultivated with enthusiasm, or to have given rise to that reputation which in later times its votaries have so justly enjoyed. Before the time of the Cæsars, it was practised only by slaves, freed men, and foreigners, and was most commonly regarded as an ignoble pursuit. From the time of the overthrow of the Roman empire, till the revival of literature and the arts, the practice of medicine sunk into the utmost obscurity. In the convulsions which overturned the Roman empire, it found an asylum in Arabia; but in so rude a nursery what advancement could it make? Although the Arabians appreciated in some degree the labours of the Romans, yet the powerful operation of religious prejudices, which prevented their examination of the dead, arrested with them the march of truth.

It was not until the reign of Louis the VII. of France, that medicine assumed any character as a regular study in Europe. During the whole of that long and dark period, when the human mind was chained to gloomy and monstrous superstitions, the practice of medicine was throughout the greater part of Europe in the hands of the clergy, who found it a profitable employment by involving it in their mysteries. Anatomy, the only true foundation of medicine and surgery, was no where taught, and the knowledge of surgical operations, imperfect even as it had been among the Greeks and Romans, was no longer to be found in papal Europe.*

I have drawn your attention to this period of medical history to shew, that no cause could have been more powerful in its regeneration, or have eventually contributed more completely to its success, than that which wrested it from the hands of ignorant pretenders, and placed it upon a scientific basis among the other faculties in the Universities of Europe. The establishment of scientific and literary colleges formed a remarkable era in the history of the human mind. These institutions were originally ecclesiastical corpora-

* Observations in defence of a bill before the House of Commons, by Mr. Chevalier, London, 1797.

tions, instituted chiefly, if not solely, for the education of churchmen. They were founded by the pope, and were so entirely under his immediate protection, that their members, whether masters or students, were exempted from the civil jurisdiction of the countries in which they were situated, and were amenable only to the ecclesiastical tribunals. Medicine was not permitted to be taught, and found no protection for a long time in the universities, throughout Europe. About the close of the twelfth century, when but the first glimmering rays of the morning light foretold the coming of a splendid age of mental illumination, it was placed by a liberal minded monarch with the faculties of divinity and the arts. It is unnecessary to pursue this portion of our subject further. I wish particularly, however, to attract your observation to the difference which the medical character has assumed with us since the revolution, and what it was at that period, and has in some degree since remained in Europe.

Medicine, if it were confined merely to a knowledge of a few diseases, their symptoms and cure, would embrace a field very limited, in comparison with that over which it must naturally expand itself in an enlightened age. If such limits were

prescribed to it, then indeed it might be attained by weak minds, and practised by the unlettered. Ignorance has proscribed its votaries in almost every age. While yet an infant science, bigotry and superstition would have strangled the Hercules as he slept; but he has lived to crush the Hydra. What science can be more favourable to the progress and cultivation of the human mind than that which leads man to an intimate acquaintance with his own economy; which traces him through every period of his existence, from life to death, from infancy to old age; which views him in his proper relation to all animate and inanimate creation; which studies him both morally and physically, in health, and in disease; which renders tributary to his wants the kingdoms of nature, and after death explores those remains which, when living, shewed attributes but a degree removed from the gods. For, "what a piece of work is man! How noble in reason! How infinite in faculties! In form and moving, how express and admirable! In action, how like an angel! In apprehension, how like a God!"

Is it then to be wondered at, that the good and great physicians of every age have been peculiarly the friends of man. Such has proved

to be the character of physicians in our own country, and it is to be hoped they will continue to cherish those liberal principles, and that ardent thirst for inquiry, which has heretofore so happily distinguished them and rendered them real ornaments of mankind.

In Europe, the relics of the ancient superstitions, the dread of innovation, and the strong arm of power have all contributed, even at the present day, to repress inquiry and fetter the human intellect. It must not be overlooked, that the impulse given by the French revolution to inquiry and research, has produced within the past thirty years, under the system of Napoleon, more important improvements in medicine, the exact, and the natural sciences, than France had attained to for centuries before. In England her constitutional system—the rewards and honours which await distinguished scientific merit have both contributed in the present, as in the past century, to give her an exalted character in medical attainment. But both in England and in France, owing to the peculiarities of their monarchies, where the rights of primogeniture too often usurp the prerogative of merit, and where scientific attainment but seldom reaches political aggrandizement, our profession can

scarcely be said to have arrived at its proper station. It is only in our own country that those who pursue the profession of medicine can be said to enjoy its true distinctions.

It would be a libel on this country, and on the profession, to say, that all who enlist beneath its banner are worthy of the exalted prerogatives which should attach to the name of a physician. Certain it is, however, that here distinction awaits upon talent, education, and merit. This essentially results from the nature of our political institutions, and is the great cause, which has operated since our separation from England, in building up medical institutions in our country, and filling them with youth of the first abilities.

Another cause which I shall notice as having conduced to the promotion and progress of medical learning in our country, is one universally operative, and the more so, as nations advance in the scale of civilization. I allude to the dependence of man upon his fellow man for mutual happiness and protection. Nor can I better illustrate the powerful inducements which it presents for medical improvement, than by drawing a parallel between diseases in the savage and civilized state, affecting each mutually, and the means separately resorted to for removing them.

It is an idea very commonly advanced, that man in a savage state is subject to few diseases, and that those comparatively mild, readily yield to the remedies which a reason, scarcely a grade above the instinct of the brute creation, has pointed out to him. That in every state of life man is familiar with disease, is abundantly shewn by the fact, that the rudest nations of which we have any record, have all possessed their materia medica—and whatever may be the cause, certain it is that the outlet of life by old age, is of more rare occurrence, comparatively speaking, in the savage, than in the civilized state. The general unhealthiness of the children of the North American Indians, has frequently been remarked by intelligent travellers who have visited them; and in the course of these observations it will be seen how fatal their epidemic diseases are. Man in the savage state, placed in the midst of the wilderness, or the trackless desert, exposed to the rigour of the elements, without sufficient clothing to protect his body, and often without aliment to appease the calls of nature, suffers in a much greater degree than in the civilized state, those physical changes which result in a loss of his health. It is equally true, that the refinements of civilized life introduce many artificial diseases

from which the savage is exempt. In tracing the remedies of barbarous nations, we find them, in every country, more inclined to rely upon the delusive hopes which a superstitious feeling produces in the human mind, than upon the active agency of any of the vegetable, or mineral productions, with which they may be acquainted. It has been beautifully expressed by a poet of nature, that "the mind untaught is but a rude waste, where fiends and tempests howl," and when the poor savage finds no alleviations for his sufferings from his few simple native remedies, he instantly applies to spells, charms, or amulets. Traces of these practices are recorded in the histories of the earliest times. Galen informs us that King Nechepsus, six hundred and thirty years before the Christian era, had written, that a green jasper cut into the form of a dragon, surrounded by rays, if applied externally, would strengthen the stomach and the organs of digestion. The power of witchcraft is firmly rooted in the minds of the aboriginal inhabitants of this country. Their remedies, which consists of various roots and plants, the properties of which they are not fond of disclosing to strangers, they generally compound, and give with the profoundest secrecy, mixed up with superstitious practices. In gen-

eral they attribute the most natural deaths to the arts and incantations of sorcerers, and their remedies in most cases, are as much directed against these, as against the disease itself. They make, however, considerable use of the barks of trees, such as the black and white oak, the white walnut, the cherry, dogwood, and others, which we know to possess active properties; yet they are so badly applied, that the autumnal intermitting and remitting bilious fevers, which set in regularly among them, when their towns are situated near marshy grounds or stagnant pools, carry off annually great numbers of every age and sex. In consequence of a want of knowledge to arrest the march of epidemic and contagious diseases, we read every where the sad memorials of the ravages which they commit among the children of the forest. Vancouver saw on the western shores of the continent of America, the earth whitened with the bones of one of the native races, which had been entirely swept off by a disastrous epidemic. In an island in the South Sea, whose simple and happy inhabitants, called to their first discoverers the recollection of the golden age; these gentle and simple people, living under the finest climate of the earth, whose mild manners and plain mode of life, might be sup-

posed to ensure them the blessings of health, were not exempt from terrible and contagious maladies. A disease not unlike leprosy was the scourge which swept them off, without their having any mode of relief, when Captain Cook first visited them. Future navigators have also observed, that they were not exempt from the complicated maladies which arise from visceral obstructions. The disease of rickets was observed in the natives of Van Damien's Land, and Captain Cook mentions that he saw among the inhabitants of Adventure Bay, a youth very much deformed with this disease, possessing the accustomed flow of animal spirits, and that versatility of mind, the common attendant on this unfortunate affection. The disease of rickets has not, however, been commonly observed among the North American tribes; but I have never seen greater deformity from this disease, than in the person of a young chief, of one of the tribes of the Upper Mississippi, recently exhibited in this city.* The Algonkins, the Hurons, the Samoides, the Kamschatdales, are all afflicted with many diseases beyond their means of cure. Worms are a most common and fatal disease among the children of savage people. Where then are their

* Shawiskanen.

boasted vermifuge medicines? Where are their remedies for general diseases? The ravages which the small pox has made, marks how inefficient are all their preventive means. Ignorant of every mode which could destroy the contagion, or prevent its dangerous effects upon the system, these miserable people have fallen victims to it, by whole tribes, when it appeared among them.

It must not be denied that we are indebted to the uncultivated reason of the savage for the introduction into our materia medica of some of its most valuable articles. But who shall say, that the illiterate Indian of the Loxa, who accidentally discovered the virtues of the Peruvian bark, by quenching his thirst in a stagnant pool, was capable of appreciating its real qualities, or of prescribing it in diseases. What a train of incurable chronic diseases, from visceral obstructions, follow the untimely or improper exhibition of the Peruvian bark.

I have said that the North American tribes used many vegetable productions, which possessed active and valuable properties; we are indebted to them for the *Polygala seneka*, *aristilochia serpentaria*, and *spiræa trifoliata*; they employed them, however, in a manner altogether empirical.

It has been correctly remarked by the most distinguished cultivator of the *materia medica* which our country has produced, that it was only with their general properties that they were acquainted. For the discovery of these even the wild instinct of the animal is often sufficient. It is the province of science, it is the duty of those who attach themselves with a well guided ardour to the amiable pursuits of medical and natural science, more especially to investigate with attention the whole of the properties of the various natural objects with which they are surrounded.* United to these diseases the habits of men in the savage state are very fatal to human life. The pressing wants of hunger and raiment; wars between man and man, and tribe and tribe, more cruel and destructive than those which are waged among civilized nations, carry every where death and destruction among them. Nature for the wisest purposes, has planted the same passions in the breasts of the human family, and man when he feels that he has nothing to consult but his individual interests, becomes a ferocious wretch, the asperity of whose manners receives no polish from happy social institutions.

* The late Professor Barton.

It cannot be argued that the discovery of powerful remedies by a rude people, give them any claims to a knowledge of healing diseases. Place in the hands of the ignorant, mercury, arsenic, opium, and bark, and of what fatal effects would they not be productive? Diseases must ever be studied more than remedies. How many changes attend them, each requiring a new remedy; how much are they altered by climate, habits, manners, and under what varying forms do they not appear in the same place at different times, demanding for their cure a different mode of treatment. If there be one within the sound of my voice who would surrender the noble science of healing diseases into the possession of superstition and folly, let him go and pay his devotions at an altar already reeking with the blood of its victims. The science of medicine is the cause of humanity. To excel in it, as it has been justly remarked, requires a greater compass of learning than is necessary in any other. Surely then there are none to contend for credulity and ignorance, when contrasted with the genial and happy influence which well educated and honourable men are capable of exerting over society at large, in the exercise of the duties of the profession of medicine.

This brings me to the consideration of the second part of my discourse, namely, what are the means likely to give increase and perpetuity to our medical character.

1. We must begin by encouraging young men of science and abilities to study medicine, by which the interests of humanity will be promoted, the science advanced, and its dignity more effectually supported.

2. By extending the time, and increasing the course of studies in our medical schools, before we confer honours, or grant diplomas.

The period of time at present allotted for the attainment of a medical education, is not, I believe, in any of our colleges more than three years, and in some much less. It is undoubtedly too short for so important an object. A young gentleman enters a physician's office, he reads twelve months, repairs to some medical college, and after an attendance, at most, on two courses of lectures, receives a degree; now during this time he may not have seen ten important cases of disease. An advocate for principles, or the philosophy of medicine, I am willing to admit that the student may learn their great outlines in the time we have mentioned, but I cannot believe that these alone will qualify him to

undertake the care of the lives of his fellow citizens. Unfortunate in my opinion, indeed, is he, who goes forth from our institutions for teaching medicine, he may have a diploma in his pocket, if he has not had other opportunities of discerning or distinguishing the diseases of mankind than such as he can carry with him from a lecture room. It has been beautifully and correctly remarked by one of the first men of the age, that a young man may become learned by sitting constantly at the feet of a master; but he can be made wise only by the executive operations of his own mind. So it is in medicine, he may learn the philosophy of the schools, but it will avail but little in subduing the diseases of our race, unless he unites with it a talent for observation and a genius for speculative inquiry, which enables him to seize new truths, and while he stores up important facts, at the same time gives to them that arrangement and connection which can alone render them valuable.

Much more attention is paid in all the countries of Europe to medical education; indeed, no science, or department of human knowledge has received more extensive contributions from public or private munificence, or of late years, been more ardently and enthusiastically cultivated.

In England the preparatory education of a physician is not inferior to any branch of science. Medicine is in that country ranked among the highest of human attainments; and the distinctions, honours, and fortune, which crown distinguished talents, gives an impulse to genius, and a spirit to industry, which has raised her medical men so pre-eminently above other nations for intellectual vigour and greatness.

A course of medical education in Great Britain after a proper basis has first been laid, embraces a period of study from five to seven years; the first two years are devoted to the study of chemistry, pharmacy, and botany; the next two are occupied in studying with a physician or surgeon, the elements of Medicine and Surgery, and the remainder spent in attending the various and extensive hospitals and lectures which are every where presented to the student. You must all be convinced on a moment's reflection how important it is for a student, before he enters on the extensive field of practice, to have previously had an opportunity of seeing and prescribing for diseases in the wards of an hospital or almshouse. So extensively are these great benefits appreciated in the European capitals, that every large hospital has become a medical school,

in which lectures are delivered and diseases illustrated at the bed sides of the patients. It is true that the want of these large establishments in our country, deprives us of the like advantages which the student can enjoy in Paris, London, or Vienna, but there is still daily an increasing necessity for supplying the deficiency, by our opening as many avenues to practical instruction as the state of our cities and their institutions will admit.

It seems to me, and on all hands it is generally agreed, that a system of instruction in medicine, to fit a young man for the duties of his profession should embrace five principal subjects.

1. An intimate acquaintance with anatomy, chemistry, and physiology. These give us a correct insight into the operations of the animal œconomy.

2. The study of the *materia medica*, pharmacy, and botany. Chemistry is the basis upon which we must learn these branches. They lead us to an acquaintance with the substances which, whether simple or compound, produce some determinate effect on the system; and are all drawn from the three great kingdoms of nature.

3. The study of the states of the system in its departure from health to disease, the causes

and symptoms. This presents the most important field for speculative inquiry. It is embraced under what is properly termed the institutes of medicine. Physiology, pathology, and therapeutics.

4. The study of practical medicine and surgery. This presupposes an intimate knowledge with all the other branches which we have stated as necessary to be studied. With it is essentially connected a course of clinical medicine, or the application of our knowledge at the bed side. There is nothing more important to the student, for here it is that he is to test his knowledge and acquirements, and supply from the active sources of his own genius whatever is wanting.

5. The preservation of the body in a state of health. This has been termed Hygiene. It is fixed in a knowledge of the operations of the living healthy economy, and the causes which produce derangement. Here we study the effect of climate, habit, dress, &c.

These are all indispensable to the attainment of a proper medical education.

It has been well remarked, that systems of education in America, notwithstanding the improvements they have undergone within a few

years past, are still extremely defective.* At present we are necessarily restricted to as few of the great objects of the profession as possible. And I will only observe, that in general, if public opinion and the prevalent usages of this country, permit the business of medical instruction to occupy so short a period, and to be hurried over with so much precipitation, it must necessarily be very imperfect, and the attainments of the student very superficial; this defect will be unavoidably felt at every stage of his subsequent career.

I have before informed you of the course pursued in the British empire on this subject. The faculty of medicine of Vienna, prescribes to the pupils five years of study. The first year they are directed to study anatomy, botany, and chemistry—in the second physiology is added to these—during the third year they continue the study of physiology, and that of pathology and materia medica is added—during the fourth year they join to the two last mentioned branches the study of practical medicine and surgery, and during the fifth year their whole attention is devoted to the extensive wards of the hospitals of the capital.

* Dr. Edward Miller.

In France, I believe the following course has been generally adopted and pursued. They do not admit of a course of study of less than six years.

1st year. Natural philosophy so far as it is connected with medicine, anatomy, and physiology. Within this period the student should commence dissection.

2nd year. Continuation of the preceding studies, dissection, chemistry, and mineralogy, zoology, and botany.

3d year. Continuation of anatomy, chemistry, and botany to which are added *materia medica*, pharmacy, and the prophylaxis, or preventive medicine.

About the middle of the third year the students begin to attend the wards appropriated to clinical instruction. They now attend a course of lectures on the elements of surgery and the various operations.

4th year. Continuation of *materia medica*, pharmacy, and prophylaxis, and the institutes of medicine, that is, pathology, nosology, and therapeutics. At this period, the students learn the art of applying bandages, and practise the operations of surgery on the dead body. They like-

wise begin the study of obstetricks, and give a large portion of their time to clinical medicine.

5th and 6th years. These are dedicated entirely to clinical medicine and surgery, and the study of medical jurisprudence.

This happy division of time and labour has had the best results in France. It has reared, under the fostering institutions of Napoleon, from indigence and obscurity, some of the first men of the present day, the ornaments of their country in peace, and its essential support in her desolating wars.

I have presented to your view this outline of the course of study observed by the most enlightened nations of the world, which I believe essentially necessary to be followed in every country, to obtain a due knowledge of the profession.

We have already seen how short and inadequate is the time allowed for the study of medicine in the United States; it does not admit of the division which allots a portion of time to the separate cultivation of each branch of medical learning. There results from this, as a consequence, that if the student's mind is not properly directed to the great leading objects of his studies from the commencement, his reading is unconnected

and without system, he flies from book to book, and from subject to subject, until he becomes involved in a labyrinth from which even the lectures he is doomed to hear, will not extricate him; and to him the noble science of medicine is but “a wild, where weeds and flowers promiscuous shoot.”

If we institute a comparison between the European medical schools and those of our own country, it must be acknowledged that we are yet in many respects very far behind them. The defect, however, is only in our system, and not in a want of talent, or acquirement, to fill the professorships—in this latter respect we come fairly and upon an equal footing. Let us then look forward to a speedy and radical change in the system of our medical education. Let the members of our profession discountenance the study of medicine, by such as are not qualified by a good preparatory education to commence it. Let us exclude them from entering our offices. Let the trustees and professors of our universities and colleges begin by extending the time and increasing the course of studies necessary to obtain medical degrees. Then, and not till then, shall we fix the profession on its true foundations.

3. The character and dignity of the profession of medicine will be advanced by protecting native talent and guarding every avenue to the honours of medicine against those, whose moral and intellectual attainments does not fit them for its responsible and delicate duties. By our laying aside all narrow, selfish, corporation-spirit; by the destruction of that self-importance, formality in dress and manners, and affection of mystery, which unhappily distinguishes too many of our calling, to the disgrace of an honourable and learned profession. For, the true dignity of physic, says the elegant Gregory, is only to be maintained by the superior learning, and abilities of those who profess it; by the liberal manners of gentlemen; and by that openness and candour, which disdain all artifice, which invite to a free inquiry, and thus boldly bids defiance to all that illiberal ridicule and abuse, to which medicine has been so much and so long exposed.

Gentlemen of the Medical Faculty,

We live in an age, and above all, in a country peculiarly favourable for mental improvement. It becomes us, as the guardians of our profession, to unite as fellow-labourers in the great cause of science and humanity. Let us

then rally round our charter, and by our united exertions ensure its beneficial influence over the medical character, and the progress of medical learning, in our state. Already has it been productive of the greatest advantages. The beautiful temple in which we are this day assembled, has arisen, as if by enchantment, since that charter was granted. As members of the same corporation, our medical college demands our co-operation and support, so long as it gives encouragement and protection to native genius, and bars its portals against the entrance of prejudice, presumption and ignorance.

I communicate to you with a sincere pleasure, the interest which was recently manifested in behalf of our body in the legislative councils of the state. It is there considered correct to strengthen our charter by additional salutary acts, and to encourage our progress by such pecuniary assistance as the means of the state may admit. What subject can present a more gratifying spectacle to every lover of his country and mankind, than to behold the steady march of improvement in the scientific institutions of America, and the generous emulation among the different states for their success and prosperity. Contrasted with recent events in Europe, how much should it excite our

admiration. We have seen a German emperor decrying learning among his subjects, as rendering them unfit for the yoke which he imposes.— We have seen a king of France, while the scaffold yet reeks with the blood of his family, shed in that awful revolution, which was commenced in the cause of man, destroying the medical school of Paris, the first institution in the world, and scattering its pupils to remote parts of his kingdom, because with a true republican spirit, they dared to resist a priest being placed over them.

“Tyrants! in vain ye trace the wizard ring;
In vain ye limit MIND’s unwearied spring;
What? Can ye lull the winged winds asleep,
Arrest the rolling world, or chain the deep?”

In this age of revolutions, our fathers have been the first to commence the great work of political regeneration and to free man from his tyrant, man;—so in the noble science of medicine, have our illustrious countrymen, been the first to free it from the tyranny of dull and senseless custom, and elevate it to the first rank in the philosophy of nature. It is thus we reflect back upon Europe a new light so auspicious to the destiny of man. Heaven forbid that it should fade with us. United in the sacred cause of truth and humanity, let us press on with a gene-

rous ardour, and a well directed zeal, to the attainment of that high intellectual and moral perfection, which will be rewarded by the blessings of our country, and the unclouded smile of our God.